Weekly Summary Report
USEPA Oversight, Sauget Area 2, Sauget, IL
WA No. 224-RXBF-05XX / Contract No. 68-W6-0025

Week Ending Friday, January 14, 2005

This report summarizes the Interim Remedial Action (IRA) work conducted by Solutia and its contractors from January 7, 2005 through January 14, 2005 at Site R, Sauget Area 2. Ongoing IRA fieldwork consists of slurry stabilization, barrier wall cap construction, and stormwater management.

Contractors Onsite

Inquip Associates Inc. (barrier wall construction contractor)
Layne-Western (drilling contractor to Solutia for extraction well/pump maintenance)
Philip Services Corporation (PSC) (contractor to Solutia for site earthwork/stormwater management)
URS (primary consultant for Solutia)

Work Performed This Week

Stormwater management was the primary activity conducted at the site during the reporting period due to significant rainfall events. In addition to stormwater management, some work was performed on the site access roads, and a check valve was installed in extraction well EW-02.

Barrier wall cap construction, site grading, slurry stabilization, decontamination and demobilization of construction equipment are expected to continue as the primary site activities during the upcoming weeks. Additionally, Solutia anticipates commencing the redevelopment of the eight barrier wall piezometers in the next week.

Groundwater Migration Control System (GMCS)

The river elevation fluctuated again during the week following significant rainfall in the area. From January 10 to 13, the river level decreased from approximately 400 feet above mean sea level (amsl) to 396.5 feet amsl. Subsequently, the river level increased sharply until January 15, when it crested at approximately 406 feet amsl. Since that time the river level decreased steadily, with an elevation at the end of the reporting period of 400.4 feet amsl.

Extraction wells EW-01 and EW-03, located in the north and south ends of Site R, respectively, remained off for most of the week. The pumps in these wells were run for roughly 24 hours on January 12 and 13. During this time, the combined system flow rate was approximately 850 gallons per minute (gpm). The center extraction well, EW-02, generally was operating during the early part of the reporting period until January 13, when the pump was turned off. At the end of the reporting period, none of the extraction wells were operating.

During the week, a 'sink hole' or area of wash out was observed next to the surface completion of EW-02. In recent weeks, the area near EW-02 had become saturated due to the significant rainfall at the site. A hole of approximately five feet in diameter and depth formed adjacent to the pitless adapter and vault of EW-02. To address the problem, the hole was filled with sand

during the reporting period.

Eight barrier wall piezometers, with four inside and four outside the barrier wall alignment, monitored the groundwater elevations adjacent to the barrier wall alignment during the week. Table 1 shows the river and piezometer water elevations measured at 11:00 AM on January 17, 2005.

ROD Performance Metrics (Gradient Across the Barrier Wall)

Throughout the reporting period, the four piezometer pairs maintained an inward groundwater gradient, toward Site R, across the barrier wall. The inside piezometers recorded water elevations varying between 2 and 9 feet lower than the water levels in their corresponding paired piezometer located outside the barrier wall.

FFS Performance Metrics (Gradient Between Inside Wall Piezometers and River)

Throughout the reporting period, the four piezometers located inside the barrier wall maintained groundwater elevations lower than the Mississippi River elevation, indicating an inward gradient toward Site R. The inside piezometers recorded water elevations varying between approximately 3 and 13 feet lower than the river level.

Table 1
River and Piezometer Water Elevations – January 17, 2005 (11:00 AM)

	Elevation (ft above mean sea level)
River Level	400.43
Piezometer 1S – inside wall (northern-most pair)	393.7*
Piezometer 1N – outside wall (northern-most pair)	397.66
Piezometer 2E – inside wall (north-central pair)	395.39
Piezometer 2W – outside wall (north-central pair)	398.85
Piezometer 3E – inside wall (south-central pair)	394.94
Piezometer 3W – outside wall (south-central pair)	398.09
Piezometer 4E – inside wall (southern-most pair)	394.98
Piezometer 4W – outside wall (southern-most pair)	397.38

* Water level at P1S measured at 9:00 AM on January 17, 2005.

Barrier Wall Cap Construction and Site Grading

No new cap construction or site grading occurred during the current reporting period. Work was conducted on some of the on-site access roads. In the upcoming weeks, cap construction will continue northward from station 25+25 toward station 26+00. Site grading activities at the site will also resume. Because of a significant amount of precipitation in the past several weeks, this work is dependent on the upcoming weather.

To date, grading and placement of topsoil has been completed on the southern half of the site, including restoration of the pre-construction stormwater drainage swales. Restoration of the northern quarter of the site, including Riverview Avenue, has also been completed. Grading and placement of topsoil in the middle portion of the site will occur after the excess slurry and

stockpile areas have been stabilized. However, a necessary precursor to this work is rehabilitation of the work area around the stockpile. This area was rutted and disturbed by construction equipment working during wet weather in December and needs to be rehabilitated by grading and gravel placement to provide a stable working platform in the vicinity of the stockpile.

Slurry

No slurry stabilization operations occurred during the reporting period. Slurry stabilization activities will resume as a new earthwork subcontractor, PSC, begins work at the site.

Stormwater

Significant rain during the early part of the week caused pooling of stormwater on site. Stormwater was collected from localized areas on site and pumped to the modutanks. As necessary, stormwater was flocculated and discharged to the American Bottoms Regional Treatment Facility (ABRTF). During the week, approximately one million gallons of stormwater were pumped to the modutanks and subsequently transferred to ABRTF during the reporting period.

As of January 14, the modutanks were at approximately 75% holding capacity. Because of below freezing temperatures, stormwater on the site cannot be pumped to the modutanks and subsequently to ABRTF until the water lines and pumps are thawed.